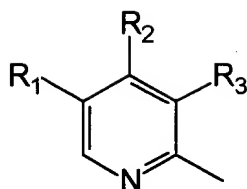
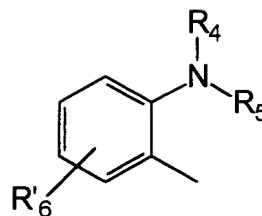


wherein

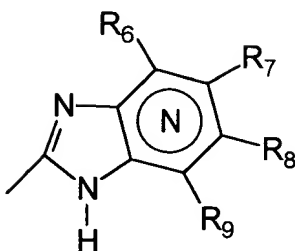
Het<sub>1</sub> is



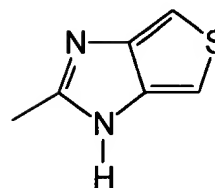
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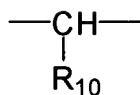
Het<sub>2</sub> is



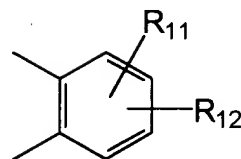
or



X =



or



wherein

N in the benzimidazole moiety means that one of the ring carbon atoms substituted by R<sub>6</sub>-R<sub>9</sub> optionally may be exchanged for a nitrogen atom without any substituents;

R<sub>1</sub>, R<sub>2</sub> and R<sub>3</sub> are the same or different and selected from the group consisting of hydrogen, alkyl, alkoxy, fluorine-substituted alkoxy [optionally substituted by fluorine], alkylthio, alkoxyalkoxy, dialkylamino, piperidino, morpholino, halogen, phenyl and phenylalkoxy;

R<sub>4</sub> and R<sub>5</sub> are the same or different and selected from the group consisting of hydrogen, alkyl and aralkyl;

R<sub>6</sub>' is hydrogen, halogen, trifluoromethyl, alkyl and alkoxy;

R<sub>6</sub>-R<sub>9</sub> are the same or different and selected from the group consisting of hydrogen, alkyl, alkoxy, halogen, halo-alkoxy, alkylcarbonyl, alkoxy carbonyl, oxazolyl, trifluoroalkyl, or adjacent groups R<sub>6</sub>-R<sub>9</sub> form ring structures which may be further substituted;

R<sub>10</sub> is hydrogen or forms an alkylene chain together with R<sub>3</sub>; and

R<sub>11</sub> and R<sub>12</sub> are the same or different and selected from the group consisting of hydrogen, halogen or alkyl.

2. (Amended) The [An] administration regimen according to claim 1, wherein [characterized in that] the H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor is a compound selected from the group consisting of omeprazole, an alkaline salt of omeprazole, the (-)-enantiomer of omeprazole and an alkaline salt of the (-)-enantiomer of omeprazole.

3. (Amended) The [An] administration regimen [~~giving an extended blood plasma profile of a~~ H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor] according to claim 1 or 2, wherein [~~any of claims 1 and 2 characterized~~

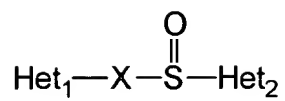
in that] the extended plasma profile is obtained by two or more consecutive oral administrations of a unit dose of the  $H^+$ ,  $K^+$ -ATPase inhibitor with 0.5 - 4 hours intervals.

4. (Amended) The [An] administration regimen ~~[giving an extended blood plasma profile of a  $H^+$ ,  $K^+$ -ATPase inhibitor]~~ according to claim 1, wherein [characterized in that] the extended plasma profile is obtained by oral administration of the [a unit dose of a] pharmaceutical formulation [preparation] which releases the  $H^+$ ,  $K^+$ -ATPase inhibitor ~~[drug]~~ for absorption in two or more discrete pulses separated in time by 0.5 - 4 hours.

5. (Amended) The [An] administration regimen according to claim 1, wherein [characterized in that] the extended plasma profile is obtained by oral administration of the [a unit dose of a] pharmaceutical formulation [preparation] which releases the  $H^+$ ,  $K^+$ -ATPase inhibitor for absorption with an almost constant rate during an extended time period.

6. (Amended) The [An] administration regimen according to any of claims 1 - 5, wherein [characterized in that] the extended plasma profile is maintained for [received during] 2 - 12 hours.

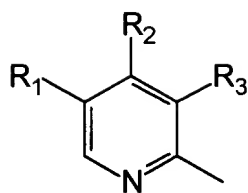
7. (Amended) An oral pharmaceutical formulation comprising an  $H^+$ ,  $K^+$ -ATPase inhibitor and a pharmaceutically acceptable carrier, wherein the formulation induces [composition giving] an extended blood plasma profile of the [a]  $H^+$ ,  $K^+$ -ATPase inhibitor and [characterized in that] the  $H^+$ ,  $K^+$ -ATPase inhibitor is a compound of [with] the formula I



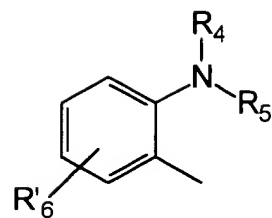
I

wherein

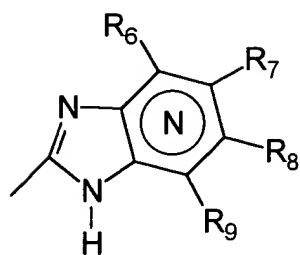
Het<sub>1</sub> is



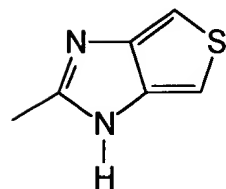
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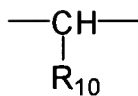
Het<sub>2</sub> is



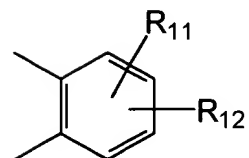
or



X =



or



wherein

N in the benzimidazole moiety means that one of the ring carbon atoms substituted by R<sub>6</sub>-R<sub>9</sub> optionally may be exchanged for a nitrogen atom without any substituents;

R<sub>1</sub>, R<sub>2</sub> and R<sub>3</sub> are the same or different and selected from the group consisting of hydrogen, alkyl, alkoxy, fluorine-substituted alkoxy [~~optionally substituted by fluorine~~], alkylthio, alkoxyalkoxy, dialkylamino, piperidino, morpholino, halogen, phenyl and phenylalkoxy;

R<sub>4</sub> and R<sub>5</sub> are the same or different and selected from the group consisting of hydrogen, alkyl and aralkyl;

R<sub>6</sub>' is selected from the group consisting of hydrogen, halogen, trifluoromethyl, alkyl and alkoxy;

R<sub>6</sub>-R<sub>9</sub> are the same or different and selected from the group consisting of hydrogen, alkyl, alkoxy, halogen, halo-alkoxy, alkylcarbonyl, alkoxycarbonyl, oxazolyl, trifluoroalkyl, or adjacent groups  
R<sub>6</sub>-R<sub>9</sub> form ring structures which may be further substituted;

R<sub>10</sub> is hydrogen or forms an alkylene chain together with R<sub>3</sub>; and

R<sub>11</sub> and R<sub>12</sub> are the same or different and selected from the group consisting of hydrogen, halogen or alkyl.

8. (Amended) ~~The [An]~~ oral pharmaceutical formulation [~~preparation~~] according to claim 7, wherein [~~characterized in that~~] the H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor is a compound selected from the group consisting of omeprazole, an alkaline salt of omeprazole, the (-)-enantiomer of omeprazole and an alkaline salt of the (-)-enantiomer of omeprazole.

9. (Amended) The [An] oral pharmaceutical formulation ~~[preparation giving an extended blood plasma profile of a H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor]~~ according to claim 7, wherein ~~[characterized in that]~~ the pharmaceutical formulation ~~[preparation]~~ releases the H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor ~~[drug]~~ for absorption in two or more discrete pulses separated in time by 0.5 - 4 hours.

10. (Amended) The [An] oral pharmaceutical formulation ~~[preparation]~~ according to claim 7, wherein ~~[characterized in that]~~ the pharmaceutical formulation ~~[preparation]~~ releases the H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor for absorption with an almost constant rate during an extended time period.

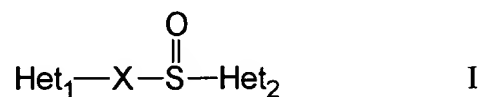
11. (Amended) The [An] oral pharmaceutical formulation ~~[preparation giving an extended blood plasma profile of a H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor]~~ according to any of claims 7 - 10, wherein ~~[characterized in that]~~ the extended plasma profile is maintained for ~~[received during]~~ 2 -12 hours.

15. (Amended) A method for improving inhibition of gastric acid secretion comprising ~~[which comprises]~~ administering to a patient in need thereof, ~~[, and]~~ the oral pharmaceutical formulation ~~[composition]~~, as claimed in any of claims 7 - 10.

16. (Amended) A method for improving the ~~[therapeutic effect in the]~~ treatment of gastrointestinal disorders associated with excess acid secretion comprising ~~[which comprises]~~ administering to a patient in need thereof, ~~[, and]~~ the oral pharmaceutical formulation ~~[composition]~~ as claimed in any claims 7 - 10.

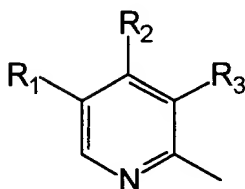
Add new claims 18 and 19:

18. An administration regimen for improved inhibition of gastric acid secretion characterized by an extended blood plasma profile of an  $H^+$ ,  $K^+$ -ATPase inhibitor, comprising the oral administration of a pharmaceutical formulation comprising a therapeutically effective amount of the  $H^+$ ,  $K^+$ -ATPase inhibitor having the formula I

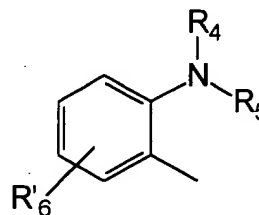


wherein

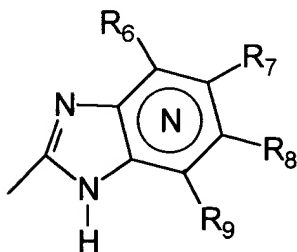
Het<sub>1</sub> is



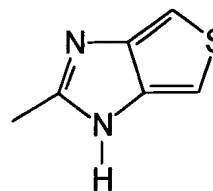
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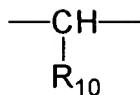
Het<sub>2</sub> is



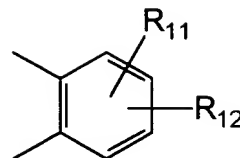
or



X =



or



wherein

N in the benzimidazole moiety means that one of the ring carbon atoms substituted by R<sub>6</sub>-R<sub>9</sub> optionally may be exchanged for a nitrogen atom without any substituents;

R<sub>1</sub>, R<sub>2</sub> and R<sub>3</sub> are the same or different and selected from the group consisting of hydrogen, alkyl, alkoxy, fluorine-substituted alkoxy, alkylthio, alkoxyalkoxy, dialkylamino, piperidino, morpholino, halogen, phenyl and phenylalkoxy;

R<sub>4</sub> and R<sub>5</sub> are the same or different and selected from the group consisting of hydrogen, alkyl and aralkyl;

R<sub>6</sub>' is hydrogen, halogen, trifluoromethyl, alkyl and alkoxy;

R<sub>6</sub>-R<sub>9</sub> are the same or different and selected from the group consisting of hydrogen, alkyl, alkoxy, halogen, halo-alkoxy, alkylcarbonyl, alkoxy carbonyl, oxazolyl, trifluoroalkyl, or adjacent groups  
R<sub>6</sub>-R<sub>9</sub> form ring structures which may be further substituted;

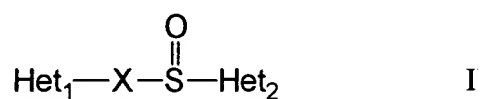
R<sub>10</sub> is hydrogen or forms an alkylene chain together with R<sub>3</sub>; and

R<sub>11</sub> and R<sub>12</sub> are the same or different and selected from the group consisting of hydrogen, halogen or alkyl,

with the proviso that the H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor is not pantoprazole.

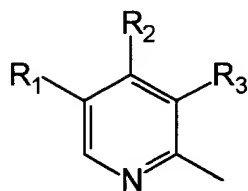


19. An oral pharmaceutical formulation comprising an  $H^+$ ,  $K^+$ -ATPase inhibitor and a pharmaceutically acceptable carrier, wherein the formulation induces an extended blood plasma profile of the  $H^+$ ,  $K^+$ -ATPase inhibitor and the  $H^+$ ,  $K^+$ -ATPase inhibitor is a compound of the formula I

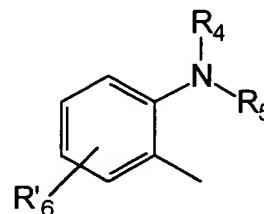


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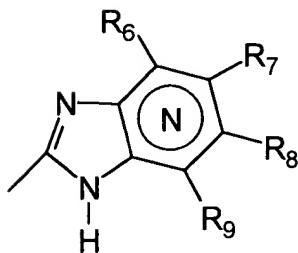
Het<sub>1</sub> is



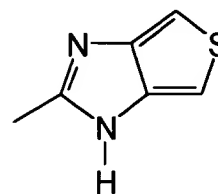
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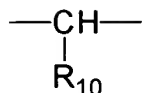
Het<sub>2</sub> is



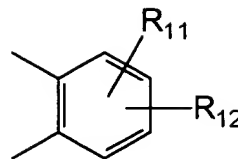
or



X =



or



wherein

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R<sub>4</sub> and R<sub>5</sub> are the same or different and selected from the group consisting of hydrogen, alkyl and aralkyl;

R<sub>6</sub>' is selected from the group consisting of hydrogen, halogen, trifluoromethyl, alkyl and alkoxy;

R<sub>6</sub>-R<sub>9</sub> are the same or different and selected from the group consisting of hydrogen, alkyl, alkoxy, halogen, halo-alkoxy, alkylcarbonyl, alkoxy carbonyl, oxazolyl, trifluoroalkyl, or adjacent groups  
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R<sub>10</sub> is hydrogen or forms an alkylene chain together with R<sub>3</sub>; and

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with the proviso that the H<sup>+</sup>, K<sup>+</sup>-ATPase inhibitor is not pantoprazole.